

Remarks

This Amendment is provided in response to the first Office Action mailed November 12, 1998, which rejected claims 18-24. In response, the Applicant has hereinabove provided certain amendments to the claims. These amendments are believed to be proper, do not introduce new matter, and will not provide an undue burden upon the Examiner. The status of the pending claims is now as follows:

<u>Claim</u>	<u>Status</u>
18. (Amended)	Independent
19. (Added 7/13/98)	Depends from claim 18.
20. (Added 7/13/98)	Depends from claim 18.
21. (Amended)	Independent.
22. (Added 7/13/98)	Depends from claim 21.
23. (Added 7/13/98)	Depends from claim 21.
24. (Amended)	Independent.

Rejection of Claims 18, 21 and 24 Under 35 U.S.C §102(e)

Claims 18 and 21

The present Application discloses a disc snubber that is supported by the actuator body, the disc snubber comprising snubber arms that provide a receiving groove between adjacent actuator arms to receivingly engage an outer edge, non-data track portion, of the disc. As shown in FIG. 6, the receiving groove provides a more narrow restriction than that of the spacing between adjacent actuator arms, so that a deflecting disc engages the snubber arm rather than the actuator arm. Noteworthy of the present invention is that the snubber arm does not extend radially into the disc stack so as to position the snubber arm adjacent to data recording surfaces on the disc, over the range of motion of the actuator arm in moving the read/write heads between

the inner and outer diameters of the disc. (see, for example, specification page 12, line 19 to page 13, line 2; page 9, lines 2-10) While examples of disclosure in the specification have been identified for reference, such are merely for purposes of illustration and are not limiting to the scope of the claims. Independent claims 18 and 21 have been amended above to more particularly point out and distinctly claim that which the inventors regard as their invention.

By contrast, Alt '770 teaches a shock bumper that is "attached to the underside of the load arm." (Alt '770, col. 9, lines 36-37) There is an explicit teaching of the shape and placement of the shock bumper. As best shown in FIG. 4A, the shock bumper 124 has a characteristic edge 124a that is just outside the flyable radius 402 of the disc 102 when the actuator assembly is parked. One skilled in the art will recognize that as the actuator 103 pivots about the pivot shaft 108 (see FIG. 1B) to bring the head 105 into a data reading and writing engagement with the disc (a counter-clockwise pivot in FIG. 4A), the shock bumper 124 becomes ever-more displaced into an overlapping relationship with the disc 102. That is, the shock bumper becomes ever-more disposed within the disc stack as the head 105 moves radially toward inner data tracks on the disc 102. Alt '770 is silent with regard to providing a shock bumper that overlaps the outer edge of the disc over the range of actuator motion, wherein the amount of overlap is minimized to prevent the contact of the snubber against data storage areas of the disc.

To sustain a rejection under Section 102, the cited reference must teach or suggest all the claimed limitations of the invention. Here, Alt '770 is silent in regard to a snubber having a characteristic shape and placement such that a minimal encroachment of the snubber arm into the disc stack is provided. The benefit resulting from the novel construction of the present invention lies in the fact that a deflecting disc engages the snubber at a non-data storage disc location,

thereby preventing the damage of stored data. In view of the claim amendments which are drawn to more particularly point out and distinctly claim the novel advancement in the art, the Applicant submits that claims 18 and 21 are allowable over Alt '770. Reconsideration and withdrawal of the rejection under Section 102 are requested.

Claim 24

The present invention is claimed in a means-plus-function format in claim 24. Section 112(6) provides that claims "shall be construed to cover the corresponding structure, material, or acts described in the specification and equivalents thereof." In *In re Donaldson* the Federal Circuit, en banc, confirmed that Section 112(6) applies to the Examiner during prosecution of the patent application. Thus, it is the Examiner's burden to provide a prima facie case of unpatentability supporting the rejection of a means-plus-function claim for reading on a prior art apparatus.

Here, the Examiner has made no prima facie case of unpatentability on the basis of structure or materials. Rather, the Examiner bases the rejection upon the acts of the present invention and the cited prior art, that both disclose "limit means (121-123 and/or 124) limiting deflection of the disc in response to application of a non-operational shock to the disc drive (100)."

Although MPEP §2183 allows the Examiner to base a prima facie case of unpatentability on an equivalent function, that provision is explicitly limited. MPEP §2183 states: "If the Examiner finds that a prior art element performs the function specified in the claim, and is not excluded by any explicit definition provided in the specification for an equivalent, then the

Examiner should infer from that finding that the prior art element is an equivalent, and should then conclude that the claimed limitation is anticipated by the prior art element. (MPEP §2183, emphasis added)

First, the Applicant has hereinabove amended claim 24 to more particularly point out and distinctly claim that which the inventors claim as their invention. By claiming the limit means as supported by the actuator, the present invention is structurally distinguished over the limit means 121-123 of Alt '770.

Second, the specification clearly defines the limit means as that which limits the deflection of an outer edge of the disc. The "Summary of the Invention" provides "The vertical height of each snubber arm limits vertical deflection of the disc at the outer radius of the disc as a result of mechanical shock forces supplied to the disc drive assembly." (specification, page 4, lines 8-10, emphasis added). By limiting the extent to which the snubber arms extend in the disc stack, damage to stored data on the disc is prevented by eliminating any contacting engagement of the snubber arm and the data storage track locations. An approach, such as Alt '770, that positions the snubber into contacting engagement with the data storage track locations is therefore not within the definition of limit means as provided in the written description of the present invention.

Accordingly, the Examiner's rejection is unsupported by a prima facie case of unpatentability. Novel advancements in the art have been described which distinguish the present invention over the cited reference, and which are patentable as claimed in claim 24 as provided by Section 112(6) in the absence of equivalency in structure, material, or acts. Reconsideration and withdrawal of the rejection of claim 24 under Section 102 are therefore

requested.

Rejection of Claims 19, 20, 22 and 23 Under 35 U.S.C. §103(a)

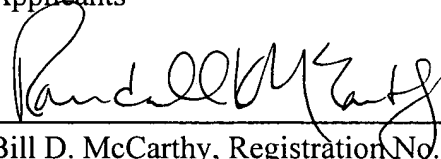
Claims 19, 20 and 22, 23 are dependent claims depending from independent claims 18 and 21, respectively, and add further limitations to the respective independent claims. Claims 18 and 21, as amended, are believed to be allowable claims. The Applicant submits that dependent claims 19, 20, 22 and 23 are, at a minimum, allowable as dependent claims which depend from an allowable independent claim. Reconsideration and withdrawal of the rejection of claims 19, 20, 22 and 23 under Section 103 are therefore requested.

It is submitted that the Application is in proper condition for reexamination and allowance. The Examiner is urged to contact the Applicant's Attorney for a telephonic interview as soon as possible should there be any remaining issues preventing the passing to issuance of the pending claims in this Application. This Amendment is intended to be a complete response to the first Office Action of 11/12/98.

Respectfully submitted,

**STEPHEN R. GENHEIMER,
KENNETH L. POTTEBAUM,
JON P. BAKER and
JOHN D. STRICKLIN**
Applicants

By:



Bill D. McCarthy, Registration No. 26,772
Randall K. McCarthy, Registration No. 39,297
Phillip L. Free, Jr. Registration No. 38,143
Crowe & Dunlevy
101 Park Avenue - Suite 250
Oklahoma City, Oklahoma 73102
Telephone: (405)232-5600